

AMENDMENTS TO THE CLAIMS

1. (Currently Amended) An image processing apparatus comprising:

an image processing section which performs system initialization processing for image processing when a power source is turned on or at a starting, and performs image processing in accordance with an instruction for execution of image processing;

an abnormal state detecting section for detecting generation of an abnormal state of the image processing section after the system initialization processing has been performed; and

a trial section which, when the abnormal state of the image processing section is detected by the abnormal state detecting section, makes a trial of ~~eliminating the abnormal state by controlling the image processing section so that to cause~~ a process or piece of equipment related to the image processing to make a transition to an initial state without performing the system initialization processing,

wherein, if the trial made by the trial section fails to cause the process or piece of equipment to make the transition to the initial state, the system initialization processing is performed.

2. (Previously Presented) An image processing apparatus according to claim 1, wherein the system initialization processing by the image processing section includes at least one of an operation of turning on again a power source of the image processing section, and an operation of downloading a parameter or a program to an image processing substrate, which is mounted in the image processing apparatus and is a part of the image processing

section.

3. (Previously Presented) An image processing apparatus according to claim 1, further comprising equipment related to the image processing,

wherein the system initialization processing performed by the image processing section includes at least one of an operation of turning on again a power source of the equipment related to the image processing and initializing the equipment related to the image processing, and an operation of downloading a parameter or a program to the equipment related to the image processing.

4. (Original) An image processing apparatus according to claim 1, wherein the abnormal state detecting section is provided so as to detect the abnormal state of the image processing section based on a determination as to whether a restart button for indicating restart of the image processing section is turned on.

5. (Previously Presented) An image processing apparatus according to claim 1, wherein the image processing section comprises a single main process and plural sub-processes, and

the trial section causes the transition to an initial state to occur by giving, to the plural sub-processes of the image processing section, an instruction for transition to an initial state.

6. (Previously Presented) An image processing apparatus according to claim 1, further comprising equipment related to the image processing,

wherein the trial section causes the transition of the equipment related to the image processing to an initial state by giving, to the equipment related to the image processing, an instruction for transition to an initial state.

7. (Previously Presented) An image processing apparatus according to claim 5, wherein the trial section makes a determination that, based on a determination as to whether a normal response with respect to the instruction for transition to an initial state is received from the sub-processes within a predetermined time, the transition to an initial state succeeds or fails.

8. (Previously Presented) An image processing apparatus according to claim 6, wherein the trial section makes a determination that, based on a determination as to whether a normal response with respect to the instruction for transition to an initial state is received from the equipment related to the image processing within a predetermined time, the transition to an initial state succeeds or fails.

9. (Previously Presented) An image processing apparatus according to claim 1, further comprising a notification section for giving notice that the transition to an initial state by the trial section succeeds or fails.

10. (Previously Presented) An image processing apparatus comprising:

an image processing section which performs system initialization processing for image processing when a power source is turned on or at a starting, and performs image processing in accordance with an instruction for execution of image processing;

an abnormal state detecting section for detecting generation of an abnormal state of the image processing section; and

a trial section which, when the abnormal state of the image processing section is detected by the abnormal state detecting section, makes a trial of eliminating the abnormal state by controlling so that at least the image processing section transits to an initial state without performing the system initialization processing; and

a start control section which, when the transition to an initial state by the trial section fails, controls the image processing section so that the image processing section is restarted and performs the system initialization processing.

11. (Currently Amended) A method for controlling an image processing apparatus including an image processing section which performs system initialization processing for image processing when a power source is turned on or at a starting, and performs image processing in accordance with an instruction for execution of image processing, said method comprising the steps of:

when an abnormal state of the image processing section is detected after the system initialization processing has been performed, making a trial of ~~eliminating the abnormal state by~~ controlling the image processing section ~~so that to cause a process or~~

piece of equipment related to the image processing to make a transition to an initial state without performing the system initialization processing; and

controlling the image processing section so that, if the transition to an initial state fails to occur, the image processing section restarts and performs the system initialization processing.

12. (Previously Presented) An image processing apparatus according to claim 1, wherein the system initialization processing includes downloading a program to an image processing substrate mounted in the image processing apparatus.

13. (Previously Presented) An image processing apparatus according to claim 1, wherein the image processing section performs a main process and manages at least one sub-process, and the trial section controls the at least one sub-process to transit to an initial state in response to detection of the abnormal state.

14. (Previously Presented) A method according to claim 11, further comprising:

utilizing one section of the image processing apparatus to make a trial of eliminating the abnormal state, and utilizing another section of the image processing apparatus to control the image processing section to restart and perform the system initialization processing if the transition fails.

15. (Previously Presented) A method according to claim 11, wherein the system initialization processing performed by the image processing section includes either: (1) turning on again a power source of the piece of equipment related to the image processing and initializing the equipment related to the image processing, or (2) downloading a parameter or program to the piece of equipment related to the image processing.

16. (Previously Presented) A method according to claim 11, further comprising:
detecting the abnormal state of the image processing section based on an emergency stop process initiated by an operator of the imager processing apparatus.

17. (Previously Presented) A method according to claim 11, wherein the image processing section performs a single main process and manages plural sub-processes, and the method further comprises:
making a trial of eliminating the abnormal state by giving, to the plural sub-processes of the image processing section, an instruction for transition to an initial state.

18. (Previously Presented) A method according to claim 17, further comprising:
determining whether the transition to an initial state succeeds or fails based on whether a normal response to the instruction for transition to an initial state is received from the sub-processes within a predetermined time.

19. (Previously Presented) A method according to claim 11, further comprising:

making a trial of eliminating the abnormal state by giving, to the piece of

equipment related to the image processing, an instruction for transition to an initial state.

20. (Previously Presented) A method according to claim 19, further comprising:

determining whether the transition to an initial state succeeds or fails based on a

whether a normal response to the instruction for transition to an initial state is received

from the piece of equipment related to the image processing within a predetermined time.